

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY REGION 10

1200 Sixth Avenue, Suite 155 Seattle, WA 98101-3188

ENFORCEMENT & COMPLIANCE ASSURANCE DIVISION

JUN 0 6 2019

Reply to: 20-C04

Mr. Bill Vandenberg Vandenberg & Sons Dairy 13503 Goodson Road Caldwell, Idaho 83607

Re:

NPDES Compliance Evaluation Inspection at Vandenberg & Sons Dairy located at 13503

Goodson Road in Caldwell, Idaho.

Dear Mr. Vandenberg:

On April 3, 2019 the PG Environmental, on behalf of the United States Environmental Protection Agency (EPA), conducted a compliance inspection at your facility. The purpose of the inspection was to determine compliance with the Clean Water Act (CWA). A copy of the inspection report is attached to this letter. Please review the inspection report, note the areas of concern, if any, and take any actions necessary to ensure compliance with the CWA.

An EPA Compliance Officer will use this inspection report in evaluating your facility's compliance with the CWA. This may result in subsequent contact from EPA personnel if a violation is identified. This letter is sent only to transmit the inspection report, and it should not be interpreted as a final compliance determination. Please direct any questions regarding compliance evaluations to Steven Potokar at (206)-553-6354 or potokar.steven@epa.gov.

Thank you for the cooperation and assistance extended to the PG Environmental staff during the inspection.

Sincerely, Left May the

Jeff KenKnight, Chief

Surface Water Enforcement Section

Enclosure

cc:

Mr. Mitch Vermeer

Idaho State Department of Agriculture

IDAHO CAFO INSPECTION REPORT

GENERAL INFORMATION

Facility ID #: N/A* - unpermitted CAFO

Facility Name: Vandenberg & Sons Dairy

Facility Owner: Bill Vandenberg

Facility Operator: Bill and Casey Vandenberg

Mailing Address: 13503 Goodson Rd.

Caldwell, ID 83607

Physical Address: 13503 Goodson Rd.

Caldwell, ID 83607

County: Canyon

Contact Person: Casey and Marnie Vandenberg

Phone (office): N/R*

(cell): (b) (6) (fax): N/R

E-mail: N/R

Persons Present During Inspection:

Bill, Casey, Marnie, Chase, and Katie Vandenberg (Vandenberg & Sons Dairy); Rick Naerebout, Megan Satterwhite, and Tanya Oldham (Idaho Dairymen's Association); Mitch Vermeer, Emily Montague, and Pradip Adhikari (Idaho State Department of

Agriculture [ISDA]); Nicole Deinarowicz and Sarah Hansen (Idaho Department of Environmental Quality);

Sirese Jacobson and Jennifer Ferrando (PG Environmental)

Max. Animals Confined per Month: 2,500

Max. Capacity of Facility: 3,050

Inspectors: Sirese Jacobson and Jennifer

Ferrando (PG Environmental)

Inspection Date: April 3, 2019

Time In:

10:22 AM

Time Out:

12:59 PM

Weather:

Partly cloudy, approx. 50° F.

GPS Reading (At Gate)

North: 43.76416 West: -116.66296

Does the facility owner/operator own and/or operate any other animal feeding operations?

If yes provide name(s) and address(es) and indicate whether the facility is an AFO or a CAFO:

Location and name of nearest surface water and description of flow path:

Vandenberg & Sons Dairy is approximately four miles north of the Boise River. Irrigation canals border the facility on the east and west sides: according to the facility representatives and based on site observation and evaluation of Idaho Department of Water Resources's interactive maps, these canals are located upgradient of the facility's impoundments and terminate in fields south of the facility.

Number of animals today (all animals in production area):

	# confined		# confined
Cattle		Sheep	
Dairy mature	2,300-2,400	Dairy heifers	
Swine (≥55#)		Swine (<55#)	
Turkeys		Laying hens	
Other chickens		Other (specify)	
X Presented credent	ials? (check if yes) Presente	ed Letter of Authorization dated Mar	ch 26, 201
	or aerial photo/site map a		

Note: The federal regulations cited throughout the checklist are included as reference for discharging CAFOs.

Potential compliance issues? (check if yes and summarize below)

^{*}NA = Not Applicable; NR = Not Requested

¹ Surface water means all waters of the United States.

SUMMARY OF POTENTIAL COMPLIANCE ISSUES

- The facility's NMP did not include site-specific conservation practices; however, the facility representatives specified that the following conservation practices are used: strip-tillage and low-pressure sprayers on the pivots. It is recommended that the facility's NMP be updated to include site-specific conservation practices. The federal regulations at 40 CFR 122.23(e)(1) require documentation of site-specific conservation practices to prevent the runoff of pollutants from land application areas is required for discharges from the land application area to a water of the U.S. to meet the agricultural storm water definition.
- According to the facility representatives, the facility was not sampling wastewater or maintaining land application records for wastewater applications. In addition, the records of compost applications documented loads hauled, but did not include calculations of tons of compost or pounds of nutrients applied. It is recommended that the facility maintain complete land application documentation to ensure that it has the information necessary to demonstrate that it is land applying nutrients in accordance with its NMP. The federal regulations at 40 CFR 122.23(e)(1) require records of land application at rates that ensure appropriate agricultural utilization of the nutrients for discharges from the land application area to a Water of the U.S. to meet the agricultural stormwater definition.
- The facility's impoundment that captures silage leachate and runoff from the south-central cattle pen
 was not listed in the facility's NMP. It is recommended that the facility revise its NMP to ensure that
 the impoundment's storage capacity is considered in the overall storage capacity for the facility.

INSPECTION OBSERVATIONS

Nutrient Management Plan (NMP)

Required NMP Element [40 CFR 122.42(e)(1)]

Indicate whether the following elements are included in the NMP:

- Yes 1. Is the facility's NMP available on-site? Does it reflect the current operational characteristics and practices? [40 CFR 122.42(e)(2)(ii)]
 - Date developed or last revised: November 20, 2017
 - All statements about the NMP in this report refer to the November 20, 2017, version of the NMP. The NMP was developed using Idaho OnePlan.
- Yes

 2. Ensure adequate storage of manure and process wastewater, including operation and maintenance procedures. [40 CFR 122.42(e)(1)(i)]

 The NMP identifies individual storage structures and capacities. Data provided in the NMP indicate that the facility has more wastewater storage capacity than required. This NMP element is not required for unpermitted CAFOs under the Clean Water Act.
- No
 3. Ensure proper management of animal mortalities. [40 CFR 122.42(e)(1)(ii)]

 The facility's NMP does not address animal mortality management. According to the facility
 representatives, mortalities are temporarily stored at a location between Lagoons 5 and 6 prior
 to removal for offsite rendering. This NMP element is not required for unpermitted CAFOs
 under the Clean Water Act.

Nutrient Management Plan (NMP) (continued)

- N/A 4. Ensure that clean water is diverted, as appropriate, from the production area. [40 CFR 122.42(e)(1)(iii)]
 Based on information provided by the facility representative and site observations, irrigation canals to the east and west of the facility as well as localized topography would prevent run-on to the production area. This NMP element is not required for unpermitted CAFOs under the Clean Water Act.
- N/A 5. Prevent direct contact of confined animals with surface waters. [40 CFR 122.42(e)(1)(iv)]

 Surface waters do not flow through any portion of the production area. This NMP element is not required for unpermitted CAFOs under the Clean Water Act.
- No
 6. Ensure proper disposal of chemicals and other contaminants. [40 CFR 122.42(e)(1)(v)]

 According to the facility representatives, all chemicals necessary for use in the operation are fully used, creating no waste chemicals for disposal. This NMP element is not required for unpermitted CAFOs under the Clean Water Act.

NOTE: Unpermitted CAFOs with agricultural stormwater runoff are required to implement the following nutrient management planning elements (7 – 10) to qualify for the agricultural stormwater exemption [40 CFR 122.23(e)]

- No 7. Identify site-specific conservation practices to control runoff of pollutants. [40 CFR 122.42(e)(1)(vi)]

 According to the facility representatives, the following practices are used to prevent nutrient loss from land application areas: strip-tillage and low-pressures sprayers on the pivots. These conservation practices are not documented in the NMP.
- 8. Identify protocols for manure, process wastewater, and soil sampling and testing. [40 CFR 122.42(e)(1)(vii)]

 The NMP includes protocols for soil testing but does not include protocols for compost and wastewater testing and the facility was not testing wastewater. Wastewater and composted manure are applied to land application sites under the operational control of Vandenberg & Sons Dairy. Unpermitted CAFOs with agricultural stormwater runoff must implement protocols for appropriate manure, process wastewater, and soil testing and maintain associated records to qualify for the agricultural stormwater runoff exemption under the Clean Water Act.

Nutrient Management Plan (NMP) (continued)

- No 9. Establish protocols to land apply manure or process wastewater in accordance with sitespecific nutrient management practices that ensure appropriate agricultural utilization of the nutrients in the manure, litter, or process wastewater. [40 CFR 122.42(e)(1)(viii)] The facility's NMP was developed using Idaho OnePlan. Provided the software addresses all necessary considerations and data elements to ensure calculation of land application rates that ensure appropriate agricultural utilization of the applied manure and wastewater, that portion of the nutrient management planning requirement is satisfied. However, because the facility operator was not basing wastewater application on the results of current wastewater analyses and could not interpret the wastewater application rates as expressed in the NMP, protocols to land apply process wastewater as specified in the facility's NMP were not being implemented. Note that the facility representatives stated that they rely on post-harvest soil sampling to evaluate whether land application was conducted at appropriate rates, based on whether phosphorus is building up in the soil. However, this method would only detect overapplication after the fact rather than preventing overapplication. In addition, the phosphorus buffering capacity of some soils could mask overapplication of manure and wastewater for several years before soil test phosphorus increases. Finally, this method does not evaluate whether compost and wastewater application exceeded the crop's nitrogen recommendation.
- No
 10. Identify specific records that will be maintained to document the implementation and management of the minimum NMP elements (#2-#9 above). [40 CFR 122.42(e)(1)(ix)]

 The NMP does not identify the site-specific records that will be maintained to document the NMP elements listed above. See question 33 below for a description of the facility's record keeping specific to the nutrient management planning elements that apply to unpermitted CAFOs in the context of the Clean Water Act agricultural stormwater exemption (#7-#9 above).

Additional NMP Requirements for Large Dairy Cow, Cattle, Swine, Poultry, and Veal Calf CAFOs

- Yes

 11. Application rates are calculated as required by 40 CFR 412.4(c)(2).

 The NMP was developed using Idaho OnePlan. Provided the software addresses field-specific risk of nitrogen and phosphorus transport to surface waters; the form, source, amount, timing, and method of nutrient application to achieve realistic yield goals; and consideration of multi-year phosphorus application, the rates in the plan were calculated in accordance with the referenced requirements. Note, however, that the wastewater application rates in the plan are expressed as percentages (versus units such as gallons per acre). The facility representatives did not know what the percentage signified. The ISDA staff stated that it represented a percent of wastewater volume but did not know whether the percentage was to be applied to the total wastewater volume or the volume of the impoundment being pumped for that particular land application event.
- No 12. Specifies the manure, process wastewater, and soil sampling at the required frequencies and for the required parameters? [40 CFR 412.4(c)(3)] (manure/wastewater annually for P & N, soils at least every 5 years for phosphorus transport)
 The NMP specifies soil sampling frequency and parameters but does not include manure and wastewater sampling protocols. This NMP element is not required for unpermitted CAFOs under the Clean Water Act; however, unpermitted CAFOs with agricultural stormwater runoff must implement protocols for appropriate manure, process wastewater, and soil testing and maintain associated records to qualify for the agricultural stormwater runoff exemption under the Clean Water Act.

Nutrient Management Plan (NMP) (continued)

No 13. Includes periodic inspection of land application equipment? [40 CFR 412.4(c)(4)]

The NMP does not address land application equipment inspection. The facility representative indicated that land application equipment is regularly calibrated and inspected for leaks. This NMP element is not required for unpermitted CAFOs under the Clean Water Act.

N/A 14. Includes 100-foot setback or 35-foot vegetated buffer, or approved alternative? [40 CFR 412.4(c)(5)]

According to the facility representatives, there are no downgradient surface waters or conduits to waters of the U.S. within 100 feet of any land application sites. Review of aerial imagery, Idaho Department of Water Resources's maps, and the NMP field maps did not indicate surface waters or conduits to waters of the U.S. within 100 feet of land application sites.

Where applicable, identify each field and setback type:

Field ID	Setback Type
N/A	N/A

Monitoring, Documentation and Recordkeeping

Does the facility maintain the following records?

- N/A 15. The completed permit application? [40 CFR 412.37(b)] Vandenberg & Sons Dairy is an unpermitted CAFO.
- No

 16. The current design of manure storage structures, including volume of solids accumulation, design treatment volume, total design volume, and approximate number of days of storage capacity? [40 CFR 412.37(b)(5)]

 The facility's NMP identifies individual storage structures, capacities, and dimensions but does not include all of the elements listed above. In addition, the NMP did not list the unnamed impoundment, located east of the silage pit, which collects runoff from the silage pit and adjacent cattle pens. This documentation is not required for unpermitted CAFOs under the Clean Water Act.
- N/A

 17. The date, time, and estimated volume of any overflow? [40 CFR 412.37(b)(6)]

 According to the facility representatives, there have been no overflows from the impoundments at Vandenberg & Sons Dairy. The inspectors did not identify evidence of overflows during the site evaluation.
- No 18. Manure and process wastewater transfers, including the most current nutrient analysis of the manure or wastewater that was provided to the recipient, the date and approximate amount transferred, and the name and address of the recipient? [40 CFR 122.42(e)(3)]
- No a. Name of recipient
- No b. Address of recipient
- No c. Date of transfer
- No d. Approximate amount transferred (tons/gallons)

No

Monitoring, Documentation and Recordkeeping (continued)

No e. Recent (12 months or less) manure nutrient analysis provided

All compost and most of the solid manure generated at the site is transferred to a third-party composter. Wastewater and small volumes of solid manure (compost) are applied to Vandenberg & Sons Dairy land application sites. This documentation is not required for unpermitted CAFOs under the Clean Water Act.

Additional Production Area Records for Large Dairy Cow, Cattle, Swine, Poultry, and Veal Calf CAFOs

No 19. Documentation of daily and weekly visual inspections of the production area, including:

a. Weekly inspection of stormwater diversions, waste storage structures, and process wastewater channeling devices? [40 CFR 412.37(b)(1)]

No b. Daily inspection of water lines? [40 CFR 412.37(b)(1)]

No c. Weekly inspection of impoundments and tanks? [40 CFR 412.37(b)(1)]

The facility representative indicated that the above items are inspected during daily drives around the production area; however, the visual inspections are not documented. This documentation is not required for unpermitted CAFOs under the Clean Water Act.

- No 20. Weekly records of the depth of manure and process wastewater in liquid impoundments and terminal tanks? [40 CFR 412.37(b)(2)]

 The facility representative indicated that lagoon wastewater levels are evaluated during daily drives around the production area. The lagoons do not include depth markers and the facility does not document freeboard or any other indicator of wastewater levels in the impoundments. This documentation is not required for unpermitted CAFOs under the Clean Water Act.
- No
 21. Documentation of actions taken to correct deficiencies found as a result of production area inspections? [40 CFR 412.37(b)(3)]

 Documentation of actions taken to correct deficiencies was not included in the records reviewed. This documentation is not required for unpermitted CAFOs under the Clean Water Act.
- Yes 22. Documentation of mortalities management? [40 CFR 412.37(b)(4)]

 Mortalities are picked up by Darling International for rendering. The facility maintains

 hauling invoices that document the dates of removal and the number of animals picked up.

 This documentation is not required for unpermitted CAFOs under the Clean Water Act.

Land Application Area Records for Large Dairy Cow, Cattle, Swine, Poultry, and Veal Calf CAFOs

Yes 23. Expected crop yields? [40 CFR 412.37(c)(1)]

Expected crop yields are included in the facility's NMP. These records may be required for unpermitted CAFOs under the Clean Water Act, to the extent that they are necessary to demonstrate land application of manure or process wastewater in accordance with site-specific nutrient management practices that ensure appropriate agricultural utilization of the nutrients in the manure or process wastewater.

Monitoring, Documentation and Recordkeeping (continued)

- No 24. Date(s) manure or process wastewater is applied to each land application site? [40 CFR 412.37(c)(2)
 - The facility representatives had records of the dates of manure applications but were not recording the dates of wastewater applications at the time of the inspection. These records may be required for unpermitted CAFOs under the Clean Water Act, to the extent that they are necessary to demonstrate land application of manure or process wastewater in accordance with site-specific nutrient management practices that ensure appropriate agricultural utilization of the nutrients in the manure or process wastewater.
- No 25. Weather conditions at the time of, and for 24 hours prior to and following, land application?

 [40 CFR 412.37(c)(3)]

 These records are not specifically required for unpermitted CAFOs under the Clean Water Act but may be useful to demonstrate land application of manure or process wastewater in accordance with site-specific nutrient management practices that ensure appropriate agricultural utilization of the nutrients in the manure or process wastewater.
- No

 26. Test methods used to sample and analyze manure, process wastewater, and soil? [40 CFR 412.37(c)(4)]

 The facility representatives had records of soil test methods but did not have records of manure test methods and were not testing wastewater. These records are not specifically required for unpermitted CAFOs under the Clean Water Act but may be useful to demonstrate land application of manure or process wastewater in accordance with site-specific nutrient management practices that ensure appropriate agricultural utilization of the nutrients in the manure or process wastewater.
- No 27. Results from manure, process wastewater, and soil analyses? [40 CFR 412.37(c)(5)]

 The facility records included results of soil and compost analyses but the facility representatives were not testing wastewater.
- Yes 28. Manure and process wastewater application rates determined in accordance with the technical standards? [40 CFR 412.37(c)(6)]

 Planned rates were calculated using Idaho OnePlan.
- Yes 29. Calculations showing the total N and P to be applied to each land application site, including sources other than manure or process wastewater? [40 CFR 412.37(c)(7)]

 The planned rates in the NMP were calculated using Idaho OnePlan. The NMP expresses planned compost application rates in tons; wastewater application rates are expressed as a percentage (see question 11 above). The inspectors did not evaluate the software, but presume, based on the information provided in the NMP, that the software calculates planned nutrient application rates based on crop nutrient needs, soil credits, and other nutrient inputs, and converts those rates to the tons or gallons to be applied based on the manure analysis data.

Monitoring, Documentation and Recordkeeping (continued)

- No 30. Total amount of N and P actually applied to each land application site, including calculations? [40 CFR 412.37(c)(8)]

 The facility's records include the loads of manure applied to each field. This does not correspond with the planned rates in the NMP, which are expressed as pounds of N, P, and K to be applied. Records of wastewater application were not maintained. Records of the total amount of N and P applied to each field are not specifically required for unpermitted CAFOs under the Clean Water Act but may be useful to demonstrate land application of manure or process wastewater in accordance with site-specific nutrient management practices that ensure appropriate agricultural utilization of the nutrients in the manure or process wastewater.
- No 31. Method used to apply manure and process wastewater? [40 CFR 412.37(c)(9)]

 All wastewater is applied at Vandenberg & Sons Dairy using pivot sprinklers. Manure is applied with a manure box spreader. The method of application is not documented in the land application records. These records are not specifically required for unpermitted CAFOs under the Clean Water Act but may be useful to demonstrate land application of manure or process wastewater in accordance with site-specific nutrient management practices that ensure appropriate agricultural utilization of the nutrients in the manure or process wastewater.
- No 32. Date(s) of manure application equipment inspections for leaks? [40 CFR 412.37(c)(10)]

 These records are not required for unpermitted CAFOs under the Clean Water Act.
 - 33. Describe the records that are maintained to document implementation of the following nutrient management planning elements [40 CFR 122.23(e)]:
 - a. Identify site-specific conservation practices to control runoff of pollutants.

 Site specific conservation practices in use at the facility include strip-tillage and low-pressure nozzles on pivots, according to the facility representatives. These conservation practices are not documented, however. These records are required for unpermitted CAFOs with agricultural stormwater runoff to qualify for the agricultural stormwater exemption under the Clean Water Act.
 - b. Identify protocols for manure, process wastewater, and soil sampling and testing.

 The facility maintains laboratory analytical reports for soil and compost testing but were not testing wastewater. These records are required for unpermitted CAFOs with agricultural stormwater runoff to qualify for the agricultural stormwater exemption under the Clean Water Act.
 - c. Establish protocols to land apply manure or process wastewater in accordance with site-specific nutrient management practices that ensure appropriate agricultural utilization of the nutrients in the manure, litter, or process wastewater.

 The facility documents the dates of manure application to each field and the loads of manure applied (which does not correspond to the format used to express planned rates in the NMP), and the acres used for land application. The facility does not maintain wastewater land application records. These records are required for unpermitted CAFOs with agricultural stormwater runoff to qualify for the agricultural stormwater exemption under the Clean Water Act.

Monitoring, Documentation and Recordkeeping (continued)

Monitoring, Documentation and Recordkeeping comments:

The inspectors were not able to compare land application records to planned rates in the NMP. The facility was not maintaining wastewater application records. The land application records reviewed were for the 2018 crop year. The manure application records documented the loads of manure applied to each field but did not track the tons of manure applied. The NMP was developed using the old ISDA program. OnePlan, which expresses planned rates in terms of pounds of N, P, and K. Therefore, the records maintained for land application, recorded as loads of manure applied, were not readily comparable to the corresponding NMP without additional information on the application equipment used and the results of the manure analyses.

Land Application Sites

Yes 34. Does the facility apply manure or wastewater to land owned by or under the operational control of the CAFO?

- Number of land application sites: <u>Number of sites not documented. The facility's NMP indicates that approximately 6,000 acres are available for land application of compost and wastewater from Vandenberg & Sons Dairy.</u>
- Irrigation type(s): Pivot
- Furrow/flood irrigation sites what is fate of applied wastewater and tailwater? N/A

Production Area

35. List impoundments

Impoundment ID	Wastewater Type	Wastewater Source(s)	Pumping level ²	Wastewater below pumping level?	Max. recorded level	Date of max. recorded level
Concrete Separator	☑ process generated ☐ runoff	milking parlor	N/A	N/A	N/A	N/A
Earthen Separator 1	☑ process generated ☑ runoff	Concrete separator, pen runoff	N/A	N/A	N/A	N/A
Earthen Separator 2	☑ process generated ☑ runoff	Earthen separator 1	N/A	N/A	N/A	N/A
Lagoon 1	E process generated E runoff	Earthen separator 2	N/A – not required for unpermitted CAFOs under the Clean Water Act	N/A	N/A	N/A
Lagoon 2	☑ process generated ☑ runoff	Lagoon 1, pen runoff	N/A – not required for unpermitted CAFOs under the Clean Water Act	N/A	N/A	N/A
Lagoon 3	☑ process generated ☑ runoff	Lagoon 2, concrete separator, pen runoff		N/A	N/A	N/A
Lagoon 4	☑ process generated ☑ runoff	Lagoon 2, concrete separator		N/A	N/A	N/A
Lagoon 5	図 process generated 図 runoff	Lagoon 2, concrete separator		N/A	N/A	N/A
Lagoon 6	□ process generated 図 runoff	Pen runoff, feed storage area runoff		N/A	N/A	N/A
Lagoon 7	□process generated 図 runoff	Tailwater from adjacent field, compost, and pen runoff		N/A	N/A	N/A

² The pumping level represents the minimum capacity necessary to contain runoff and direct precipitation from the 25-year, 24-hour rainfall event (40 CFR 40 CFR 412.37(a)(2)).

Impoundment ID	Wastewater Type	Wastewater Source(s)	Pumping level ³	Wastewater below pumping level?	Max. recorded level	Date of max. recorded level
Lagoon 8	□process generated ☑ runoff	Compost		N/A	N/A	N/A
Unnamed impoundment	図process generated 図 runoff	Silage pit runoff and leachate, pen runoff		N/A	N/A	N/A
	ent(s) collect al					
	e storage areas					
	aterial storage					
	containment ar					

N/A Egg washing or egg processing facility?

Yes Mortality storage, handling, treatment or disposal area?

N/A Other? (describe): N/A

No Was manure or wastewater observed in a waterway? If yes, describe: N/A

Yes 37. Adequate storage available for manure, litter, and process wastewater, and procedures are in place to ensure proper operation and maintenance of the storage facilities? [40 CFR 122.42(e)(1)(i)]

<u>Lagoons 1 – 8 had remaining capacity. Lagoon 5 was completely empty. No evidence of uncontained manure or wastewater was observed.</u>

Yes 38. Confined animals do not have direct contact with waters of the United States? [40 CFR 122.42(e)(1)(iv)]

Waters of the U.S. do not flow through the animal confinement areas.

³ The pumping level represents the minimum capacity necessary to contain runoff and direct precipitation from the 25-year, 24-hour rainfall event (40 CFR 40 CFR 412.37(a)(2)).

⁴ Animal confinement area includes but is not limited to open lots, housed lots, feedlots, confinement houses, stall barns, free stall barns, milkrooms, milking centers, cowyards, barnyards, medication pens, walkers, animal walkways, and stables (40 CFR 40 CFR 122.23(b)(8)).

⁵ Manure storage area includes but is not limited to lagoons, runoff ponds, storage sheds, stockpiles, under house or pit storages, liquid impoundments, static piles, and composting piles (40 CFR 40 CFR 122.23(b)(8)).

⁶ Raw materials storage area includes but is not limited to feed silos, silage bunkers, and bedding materials (40 CFR 40 CFR 122.23(b)(8)).

⁷ The waste containment area includes but is not limited to settling basins, and areas within berms and diversions which separate uncontaminated storm water (40 CFR 40 CFR 122.23(b)(8)).

Production Area (continued)

- N/A

 39. Clean water is diverted from the production area? [40 CFR 122.42(e)(1)(iii)]

 Based on information provided by the facility representative and site observations, berms maintained by the irrigation district along irrigation canals located upgradient to the east and west of the facility as well as localized topography would prevent run-on to the production area. Dry conditions during the inspection prevented observation of localized stormwater runoff flow.
- Yes 40. Chemicals and other contaminants handled on-site are not disposed of in any manure, litter, process wastewater, or storm water storage or treatment system? [40 CFR 122.42(e)(1)(v)]

 The facility representative stated that all chemicals necessary for use in the operation are fully used, creating no waste chemicals for disposal. The inspectors did not evaluate the chemical storage location but did not identify evidence of improper chemical disposal.

Additional Production Area Requirements for Large Dairy Cow, Cattle, Swine, Poultry, and Veal Calf CAFOs (Subparts C and D)

- No 41. All open surface impoundments and terminal storage tanks have depth markers which clearly indicate the minimum capacity necessary to contain the runoff and direct precipitation of the 25-year, 24-hour rainfall event? [40 CFR 412.37(a)(2)]

 Depth markers are not required for unpermitted CAFOs under the Clean Water Act.
- Yes 42. Mortalities remain in the production area until disposal, are not disposed in liquid manure or process wastewater treatment systems, and are handled to prevent discharge of pollutants to surface waters? [40 CFR 412.37(a)(4)]

 Mortalities are stored temporarily on site prior to pick up by the rendering company. The mortality storage location is between Lagoons 5 and 6; runoff from this area flows to Lagoon 5.

Production Area (continued)

Production area comments:

Wastewater from the milking parlor flows to a Concrete Separator located east of the milking parlor. Solids are removed from the Concrete Separator once every two weeks. Wastewater from the Concrete Separator is pumped to Earthen Separator 1, then overflows to Earthen Separator 2, in series. The Earthen Separators also receive runoff from the cattle pens located west and northwest of the separators. Wastewater from Earthen Separator 2 flows into Lagoon 1. From Lagoon 1, wastewater is pumped to the adjacent pivot or to Lagoon 2. Lagoon 2 also receives runoff from the cattle pens to the east of the lagoon. Wastewater from Lagoon 2 is pumped to Lagoons 3, 4, or 5, as needed. Wastewater can also be pumped from the Concrete Separator to Lagoons 3, 4, or 5 if needed. Lagoons 2 and 3 also receive runoff from the cattle pen located east of Lagoon 2. According to facility representatives, solids are removed from Lagoon 2 once per year.

Lagoon 6 captures runoff from the cattle pens to the north and east of the lagoon and the commodities storage area located east of the lagoon. The facility representatives also identified another impoundment located east of the silage pit, which captures silage pit runoff and leachate as well as runoff from the pens immediately north of the impoundment. This impoundment was not identified in the facility's NMP.

Lagoon 7, located at the southeast corner of the cattle pens collects runoff from the cattle pens to the west, as well as tailwater from the adjacent pivot field and runoff from a portion of the compost area located east of the lagoon. A portion of the runoff from that compost area also flows to Lagoon 8, which is located between the compost area and the pivot field.

The inspectors observed minor gully erosion on the embankments of Lagoon 7 and recommended that the facility operators monitor to ensure erosion does not progress to a level that would compromise the integrity of the lagoon liner.

The facility has a second compost area located in a pivot corner southeast of the silage and feed storage area, which is used as needed for additional capacity. According to the facility representatives, one compost row is positioned along the south end of compost area to prevent runoff to the adjacent pivot field.

Inspector:

Date: 5/30/2019

Aerial Photo/Site Map

